

ISKHAKOV, S. I., Cand Med Sci — (diss) "Dermatomycoses in Tadzhik SSR and the  
sanitary education as a factor in their prophylaxis," Tashkent, 1960, 16 pp  
(Tashkent State Medical Institute) (KL, 37-60, 122)

ISKHAKOV, S.I., kand. med.nauk; MARAMZIN, B., red.; ANISIMOVA, R.,  
tekhn. red.

[Sanitary education in the Tajik S.S.R.] Sanitarnoe prosve-  
shchenie v Tadzhikskoi SSR. Dushanbe, Tadzhikgosizdat, 1962.  
98 p. (MIRA 16:4)

(TAJIKISTAN--HEALTH EDUCATION)

ISKHAKOV, S. I.

Study of epidermophyte disease incidence among the population  
of Dushanbe and the Vakhsh Valley. Zdrav. Tadzh. 9 no.2:27-28  
Mr-Apr '62. (MIRA 15:7)

1. Iz kafedry kozhnykh i nevericheskikh bolezney (zav. - doktor  
med. nauk B. R. Rakhmatov) Dushanbinskogo meditsinskogo instituta  
imeni Abuali ibni Sino.

(DUSHANBE—DERMATOMYCOSIS)  
(VAKHSH VALLEY—DERMATOMYCOSIS)

ISKHAKOV, S.I.

Petr Fokich Borovskii and the study of cutaneous leishmaniasis;  
on the centenary of his birth. Zdrav. Tadzh. 10 no.3:42-44 '63.  
(MIRA 17:4)

ANGELEYKO, V.I. (Khar'kov); ZOTKIN, G.V. (Khar'kov); FREDORETS, V.M.  
(Khar'kov); ISKHAKOV, S.I. (Khar'kov); KRIVENKOV, K.V.  
(Khar'kov); RYBIN, A.S. (Khar'kov).

New grindstones. Put' i put. khoz. 8 no.11:26-27 '64  
(MIRA 18:2)

SHARYGIN, A.I.; PEYSAKH, I.I.; ISKAKOV, S.I.; MITROFANOV, V.N.; SHASTINA, Z.Ya.;  
SHCHERBAKOV, I.M.; GOMBERG, I.B.

Information. Tekst. prom. 24 no.9:91-97 S '64.

(MIRA 17:11)

1. Direktor Voronezhskoy kordnoy fabriki (for Sharygin).
2. Nachal'-nik proizvodstvenno-tekhnicheskogo otdela upravleniya legkoy promyshlennosti Soveta narodnogo khozyaystva Moldavskoy SSR (for Peysakh).
3. Nachal'nik konstruktorskogo otdela Spetsial'nogo konstruktorskogo byuro Yuzhno-Kazakhstanskogo Soveta narodnogo khozyaystva (for Isakov).
4. Nachal'nik konstruktorskogo sektora Spetsial'nogo konstruktorskogo byuro Yuzhno-Kazakhstanskogo soveta narodnogo khozyaystva (for Mitrofanov).
5. Nachal'nik Byuro tekhnicheskoy informatsii Melekesskogo l'nokombinata (for Shastina).
6. Glavnyy inzh. Khersonskogo khlopchatobumazhnogo kombinata (for Shcherbakov).
7. Nachal'nik tekhnicheskogo otdela Khersonskogo khlopchatobumazhnogo kombinata (for Gomberg).

S/137/63/000/001/014/019  
A006/A101

**AUTHORS:** Pyatakova, L. L., Iskhakov, S. S., Shitov, A. P., Miroshnikova, K. Ye.

**TITLE:** On the mechanism of the effect of some elements upon the properties of carburized steel

**PERIODICAL:** Referativnyy zhurnal, Metallurgiya, no. 1, 1963, 50, abstract 11283  
(In collection: "Novoye v metalloved. i tekhnol. term. obrabotki stali", Chelyabinsk, 1962, 7 - 23)

**TEXT:** The authors investigated the Si-Mn steel system containing in %:  
C 0.15 - 0.24, Si 0.80 - 1.30, Mn 1.5 - 2.00 with admixtures of V, Cu, W, B, Ti, Cr and Mo. The steel is intended for the production of gears. The effect of alloying elements upon martensite transformation was studied.  $M_s$  is most strongly reduced by Mn and Cr; less by Ni, V, Mo, and is almost not reduced by Si and Cu. Due to alloying with Si (1.0 - 1.3%) it is possible to prevent, during carburizing, oversaturation of the surface C layer and to obtain a necessary depth of the carburized layer at an optimum C content (0.85 - 0.9%). Si-Mn

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On the mechanism of the effect of...

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steels have a martensite transformation temperature as high as 300 to 365°C. Admixtures of Mo, V, Cr (0.5 - 0.7%) or B (0.001 - 0.002%) to Si-Mn steel secure high roasting ability and satisfactory properties on large-size parts, up to 100 mm in diameter. Si-Mn steels have  $\sigma_b$  132 - 167 kg/mm<sup>2</sup>,  $\sigma_s$  122 - 145 kg/mm<sup>2</sup>,  $\delta$  10 - 15%,  $\psi$  53.5 - 66.6%,  $a_k$  10.3 - 13.8 kgm/cm<sup>2</sup>; grain size is 2.9 - 3.2. Additional alloying of the steel with V, Cu and Mo prevents grain growth, strengthens the grain boundaries and increases roasting ability. Alloying affects the failure resistance of the steel due to its increased ductility (in martensite state). Grade 17CF2M (17SG2M) steel, developed on the basis of the investigations, offers high fatigue contact and operational strength. The use of this steel instead of 12X2H4 (12Kh2NCh) steel yields savings of about 70 rubles per 1 ton. There are 12 references.

L. Koblikova

[Abstracter's note: Complete translation]

Card 2/2



SOROKIN, V.K., kand.tekhn.nauk; ISKHAKOV, S.S., Inzh.

Investigating structure formation during the sintering of iron-graphite alloys. Trudy GPI 19 no. 1:60-68 '63. (MIRA 17:7)

BIDULYA, P.N.; ISKAKOV, S.S.; KIMOV, V.S.

Effect of extrusion parameters on the crystallization of castings  
pressed out of liquid steel. Izv. vys. ucheb. zav.; chern. met.  
8 no.9:184-186 '65. (MIRA 18:9)

1. Moskovskiy vecherniy metallurgicheskiy institut.

ISKHAKOV, Tair, assistant

Practical training in mulberry silkworm culture in rural schools.  
Uch. zap. Tashk. gos. ped. inst. 35 no.1:60-66 '63.  
(MIRA 17:9)

SHINKEVICH, Zinaida Markovna; ISKHAKOV, Tair; LUNEZHEVA, M.S., red.

[Practical studies at a school experimental and training plot; textbook for students of the 7th grade of Uzbekistan schools] Prakticheskie zaniatiia na shkol'nom uchebno-opytnom uchastke; uchebnoe posobie dlia uchashchikhsia 7-go klassa shkol UzSSR. Izd.4. Tashkent, Sredniaia i vysshaia shkola, 1963. 154 p. (MIRA 17:10)

ISKHAKOV, T.G.

Effect of the mass of billets on the laws of motion of vibratory  
bunkers. Trudy KAI 72:3-15 '62. (MIRA 16:8)  
(Feed mechanisms)

ISKHAKOV, T.G.; MITRYAYEV, I.M.

Arrangement of type bars in the segments of typewriters. Trudy  
KAI 72:16-24 '62. (MIRA 16:8)

(Typewriters)

7, 20796-65 EWT(1)/EWT(m)/EPT(c)/EPR/T Pr-1/Pr-1 AEDC(a)/ASD(f)-3 JD/DJ

ACCESSION NR: AR4047539

S/0277/64/000/008/0040/0040

SOURCE: Ref. zh. Mashinostr. mat., konstr. i raschet detal. mash. Old. vy"p.:  
Abs. 8.48.281

AUTHOR: Iskhakov, T.G.

TITLE: The bearing capacity of partially-enclosed aerodynamic bearings (plane problem)

CITED SOURCE: Tr. Kazansk. aviats. in-ta, vy"p. 81, 1963, 44-58

TOPIC TAGS: aerodynamic bearing, bearing capacity, partially enclosed bearing,  
pressure distribution, bearing friction //

TRANSLATION: Under the normal premises (small clearance, no boundary layer, laminar flow, negligible forces of inertia, isothermic law), the differential equation for the distribution of pressures in an infinitely long bearing is differentiated into two equations for the upper and lower section of the bearing shell. The point is made that in the problem of the partially-enclosed bearing, in addition to the usual (for the completely-enclosed bearing) parameters (namely  $\epsilon$  - the relative eccentricity and  $\chi$  - the characteristic), two additional parameters are encountered:  $2\theta$  and  $\varphi$  - the enclosure angle and the

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ACCESSION NR: AR4047539

load angle. Two limiting cases are considered for values of  $2\theta = 180^\circ$  and  $\gamma = 90^\circ$ . When  $\omega = \infty$  (an infinitely great speed of rotation), the basic equation has the integral  $P h = \text{const}$  ( $h$  = the running free play). From the symmetry of the boundary conditions in this case there follows the symmetry of the pressure distribution pattern. The resultant forces of pressure and friction are found. The frictional forces cause a shift in the journal center from the load line (similar to the shift in a rotating dry friction couple) by the negative angle  $\varphi = \frac{\pi}{2}$  (angle of eccentricity), which under real limiting conditions does not exceed  $25^\circ$ . When  $\gamma = 0$  (infinitely small rotational speeds), the basic equation coincides with the equation for a liquid lubricant, and is integrated in its final form. As in a completely-enclosed bearing at low rotational speeds, the gas jet does not increase the bearing capacity, the sole difference being that, with partial enclosure, the journal shifts by an angle other than a right angle (a formula is given for the computation of this shift angle). The author points out that in a general case (finite  $\gamma$ ), the integration of the basic equation, which is normally numerical, is a more difficult problem for the partially-enclosed bearing because of the presence of the new parameters. In the numerical integration of the equation, use is made of the fact that the moving equilibrium

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curve for arbitrary  $\chi$  lies between the curves which correspond to the limiting (critical) values. Results are given for the integration of the problem ( $\gamma = 1, C_0 = 0.1 - 0.5$ ). These results were obtained on a "Minsk" computer. It is noted that the bearing capacity of a bearing with one-half enclosure angle is only slightly inferior to that of bearings with full enclosure, and decreases as  $\theta$  decreases. Bibliography with 5 references. Ye Malakhovskiy

SUB CODE: DE, ME

ENCL: 00

Card 3/3

ISKHAKOV, I.G.

Carrying capacity of gas-lubricated bearings with incomplete  
envelopment. Trudy KAI no.81:45-58 '63. (MIRA 18:4)

L 8301-66 EWT(1)/EWT(m)/FCS(f)/I-2/ETC(m) ID/MM/DJ  
ACC NR: AT5026396 SOURCE CODE: UR/2529/63/000/081/0045/003

AUTHOR: Iskhakov, T. G. (Senior lecturer)

ORG: Kazan Aviation Institute (Kazanskiy aviatsionnyy institut)

TITLE: Load capacity of partially enclosed aerodynamic bearings (two-dimensional case)

SOURCE: Kazan. Aviatsionnyy institut. Trudy, no. 81, 1963. Prikladnaya mekhanika (Applied mechanics), 45-58

TOPIC TAGS: aerodynamic characteristic, split bearing, bearing load, gas bearing, journal bearing, differential equation, ANTIFRICTION BEARING

ABSTRACT: Based on the well-known differential equation for the pressure distribution in a closed aerodynamic journal bearing, the differential equations for the upper and lower halves of a split bearing are derived as

$$\frac{dp_I}{dz} = \frac{1 - \epsilon \cos \alpha}{(1 - \epsilon \cos \alpha)^2} \frac{\bar{p}_a}{\bar{p}} - \frac{1}{(1 - \epsilon \cos \alpha)^2}$$

$$\frac{dp_{II}}{dz} = \frac{1 + \epsilon \cos \alpha}{(1 + \epsilon \cos \alpha)^2} \frac{\bar{p}_a}{\bar{p}} - \frac{1}{(1 + \epsilon \cos \alpha)^2}$$

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(where

$$\bar{p} = \frac{p}{p_1}$$

$$\lambda = \frac{6\mu U r}{\delta^3 p_1}$$

$p_1$  = pressure at separation line;  $\bar{p}_n$ ,  $\alpha_n$  = minimum pressure in upper half and corresponding angle). The pressure regimes in a closed and split bearing are shown in Fig. 1, where the boundary conditions for the differential equations are

$$p_1(\alpha = \alpha_1) = \bar{p}_1(\alpha = \alpha_1) = \bar{p} = 1$$

and are related to  $2\theta$  and  $\psi$  by

$$\alpha_1 = \psi + \theta, \quad \alpha_2 = \psi - \theta.$$

After restricting the discussion to the case of  $2\theta = 180^\circ$ ,  $\phi = 90^\circ$ , the behavior of the limiting cases of  $U \rightarrow \infty$  and  $U \rightarrow 0$  is evaluated and qualitatively compared with corresponding behavior of closed bearings. The general case can be solved by using numerical integration similar to that used by S. A. Sheynberg (Gazovaya smazka podshipnikov skol'zheniya. Treniye i iznos o mashinakh, sb. VIII, izd-vo AN SSSR, 1953) for the closed bearing case in which a function of the form

$$\frac{d\bar{p}}{d\alpha} = \frac{\lambda}{(1 - \epsilon \cos \alpha)^2} \left[ \frac{C_m}{(1 - \epsilon \cos \alpha) \cdot \bar{p}} - 1 \right]$$

is assumed. This can be done by choosing  $\psi$  for a given  $\lambda$ , determining  $C_m$  (for Card 2/4

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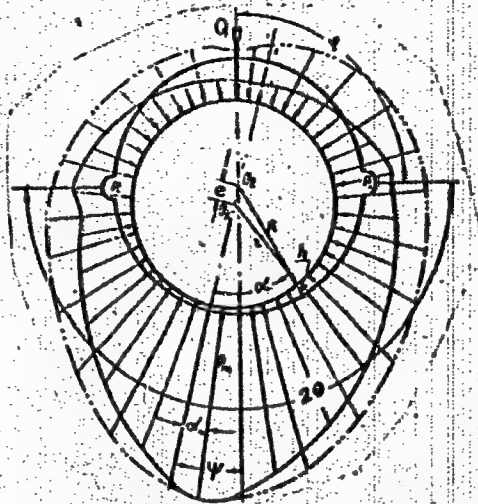


Fig. 1. Pressure distribution in aerodynamic bearing

$0 < \epsilon < 1$ ) by preliminary integration and then determination of the pressure distribution as a function of the angle. A sample calculation, performed on a Card 3/4

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ACC NR: AT5026396

44  
"Minsk" computer by N. A. Yakhina, gave results shown graphically and which are similar to those obtained for a closed bearing. Orig. art. has: 3 figures and 23 formulas. 2

SUB CODE: 13/ SUBM DATE: 03-Jul63/ ORIG REF: 004/ OTH REF: 001

BC  
Card 4/4

ISKHAQOV, T.M.

Work of the tuberculosis sanatorium of the "Stalingrad" Collective Farm of Tyura-Kurgan District, Namangan Province. Med. zhur.Uzb. no.6:18 Je '58. (MIRA 13:6)

1. Glavnyy vrach protivotuberkuleznogo sanatoriya kolkhosa "Stalingrad" Tyura-Kurganskogo rayona Namanganskoy oblasti.  
(TYURA-KURGAN DISTRICT--TUBERCULOSIS--HOSPITALS AND SANATORiums)

L 39836-66 INT(d)/INT(m)/SWP(k)/SWP(w)/SWP(v) LJP(c) SW/WW/CC-2  
 ACC NR: AF6020120 SOURCE CODE: UR/0097/66/000/001/0042/0047

AUTHOR: Khaydukov, G. K. (Doctor of technical sciences; Professor); Iskhakov, Ia. Sh.  
 (Engineer)

ORG: none

TITLE: Model investigation and calculation of smooth rectangular shells of positive gaussian curvature for equilibrium limit

SOURCE: Beton i zhelezobeton, no. 1, 1966, 42-47

TOPIC TAGS: shell structure, test model, shell deformation, mechanical fracture, construction material

ABSTRACT: 1/6 natural size models plus samples of proposed construction materials to be used in building a gaussian-curvature roof shell were tested, in two main variants. One in which the shell could be load-deformed, another in which steel bracing prevented this. The investigations demonstrated that the smooth shells of positive gaussian curvature with contour rectangularly deformed in plan were  $l_1:l_2=1:2.5-1:8$ , a fracture pattern in the form of concentric ellipses, within which the sheet loses its initial elevation and tends to change form, is possible. The limiting load for the elliptical pattern can be found from the conditions of limiting equilibrium on the basis of the deformation state of the shell. The load-bearing capacity of the

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rectangular smooth shells with displaceable longitudinal edges can be calculated by the limiting equilibrium method for the three main types of fracture - beam, hipped and elliptical. Orig. art. has: 7 figures, 2 tables, and 18 formulas. [JPRS]

SUB CODE: 20, 13 / SUBM DATE: none / ORIG REF: 006

Card

2/2

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ISKHAKOV, Yu.I.

[Development of cotton growing in Uzbekistan] Razvitie khlopkovodstva  
v Uzbekistane. Tashkent, Gos. izd-vo Uzbekskoi SSR, 1960. 287 p.  
(MIRA 14:7)

(Uzbekistan—Cotton growing)

ISKHAKOV, Z. A.

"Investigation of the Digestive Activity of Karakul Sheep Under Desert Conditions." Cand Biol Sci, Inst of Physiology imeni I. P. Pavlov, Acad Sci USSR (Apr-Jun 54). (Vest Ak Nauk, Nov 54)

Survey of Scientific and Technical Dissertations Defended at USSR Higher Educational Institutions (11)

SO: Sum. No.521, 2 Jun 55

ISKHAKOV, Z.A.

Bile-secreting function of liver at high temperatures. Uzb.  
biol.zhur. 7 no.2:66-69'63. (MIRA 16:8)

1. Institut krayevoy eksperimental'noy meditsiny AN UzSSR.  
(BILE) (HEAT—PHYSIOLOGICAL EFFECT)

ISKHAKOV, Z.A.

Bile secretion functions of the liver depending on the food composition. Uzb. biol. zhur. 8 no.1:64-68 '64.

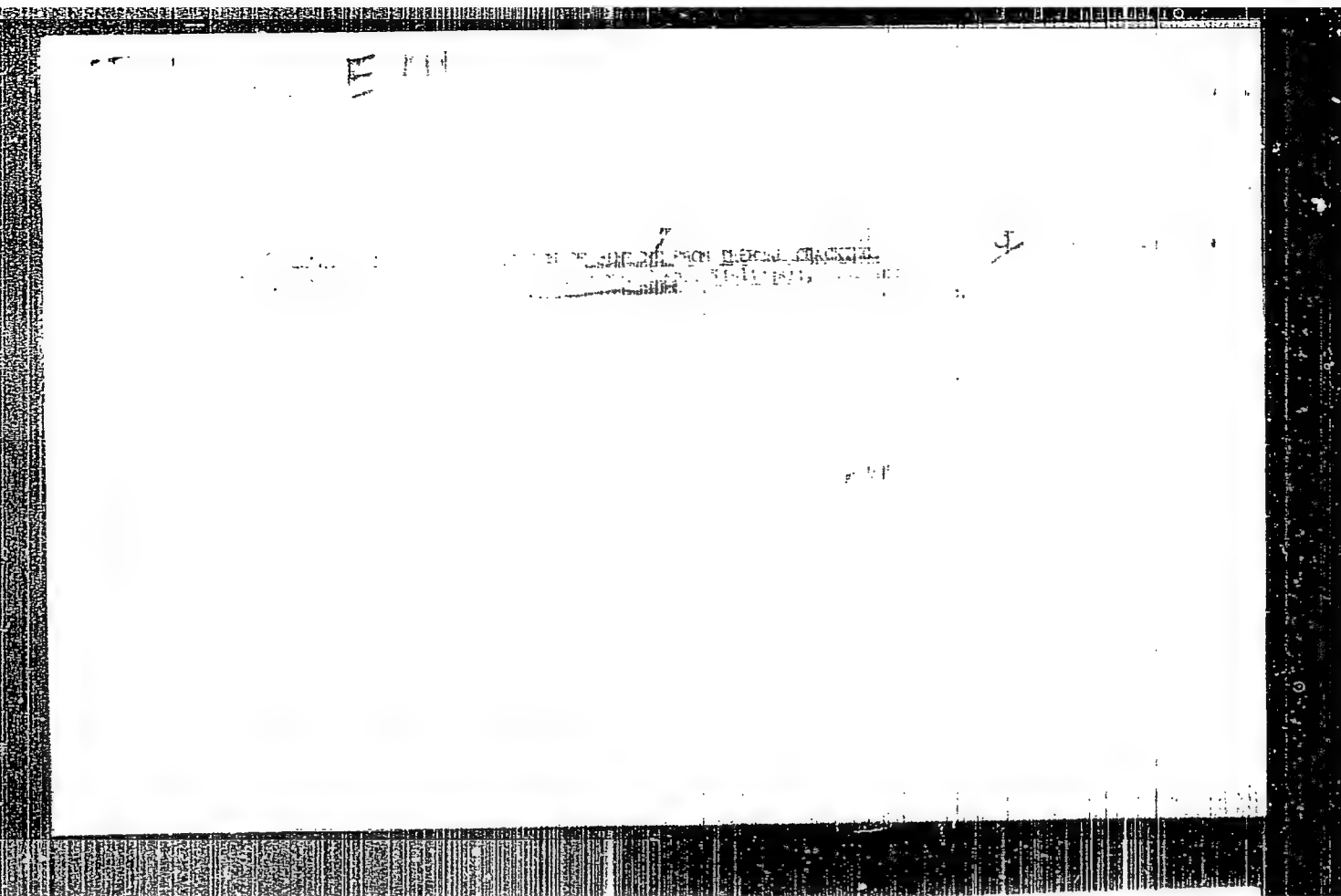
(MIRA 17:10)

1. Institut krayevoy eksperimental'noy meditsiny AN UzSSR.

ISKHAKOVA, D.I., kand.med.nauk

Prevention and treatment of pneumonia in newborns. Med. zhur. Uzb.  
no.2:29-30 F '60. (MIRA 15:2)

1. Iz kafedry fakul'tetskoy pediatrii (zav. - dotsent A.M.Maksudov  
[deceased]) Tashkentskogo gosudarstvennogo meditsinskogo instituta.  
(PNEUMONIA) (INFANTS (NEWBORN) DISEASES)



ISKHAKOVA, E. Kh.

ARBUZOV, B.A.; ISKHAKOVA, E. Kh.

Diene synthesis of anthracene with acrolein and acrylic acid  
nitrile. Uch.zap.Kaz.un. 116 no.5:113-116 '56. (MLA 10:4)

1. Kafedra organicheskoy khimii.  
(Acrolein) (Chemistry, Organic--Synthesis)



ISKHAKOV E.Kh.

TOPCHIYEV, A.V.; ISKHAKOV, E.Kh.; MUSAYEV, I.A.; GAL'PERN, G.D.

Chromatographic separation of benzene produced by thermal cracking.  
Khim. i tekhn. topl. i masel no.11:26-33 N '57. (MIRA 11:1)

1. Institut nefti AN SSSR.  
(Gasoline--Analysis) (Chromatographic analysis)

ISKHAKOVA, E.Kh., Cand Chem Sci—(diss) "Study of the chemical composition of benzene of thermal cracking." Mos, [Publishing House of the Acad Sci USSR, 1958, 12 pp Acad Sci USSR, Inst of Petroleum), 175 copies (KL, 45-58, 1:2)

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~~SECRET~~  
ISKHAKOVA, S. Kh.  
5(3); 11(4)

PHASE I BOOK EXPLOITATION SCV/2221

Akademiya nauk SSSR. Institut nefti

Trudy, t. 12 (Transactions of the Petroleum Institute, USSR, Academy of Sciences, Vol 12) Moscow, Izd-vo AN SSSR, 1958. 395 p. Errata slip inserted. 1,700 copies printed.

Ed.: S. R. Sergiyenko, Professor; Ed. of Publishing House: K. G. Miyessarov; Tech. Ed.: V. V. Golubeva.

**PURPOSE:** The book is intended for scientists, engineers, and technicians in the petroleum industry.

**COVERAGE:** This collection of articles describes the results of studies on the chemistry and technology of petroleum and gas conducted in the laboratories of the Petroleum Institute, Academy of Sciences, USSR, in 1956 and 1957. A new section "Petrochemical Synthesis and Technology of Petroleum" has been included in the collection of articles. A list of investigations published by the associates of the Institute in 1956 and 1957 and a list of dissertations for the Doctor's and Candidate's degrees presented in 1956 and 1957 at open sessions of the Academic Council of the Petroleum Institute, Academy of Sciences, USSR, are given.

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There are 349 references: 199 Soviet, 112 English, 29 German, 6 French, and 3 Japanese.

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### III. CATALYSIS AND CATALYSTS

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Card 8/9

Transactions of the Petroleum Institute, USSR (Cont.)

SOV/2221

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372

Dissertations presented at sessions of the Academic Council of the Petroleum Institute, Academy of Sciences, USSR, in 1956 and 1957

375

Investigations on the chemistry and technology of petroleum and gas carried out at the Petroleum Institute, Academy of Sciences, USSR, and published in 1956-1957

376

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391

AVAILABLE: Library of Congress

Card 9/9

TM/mg  
10-30-59

TOPCHIIYEV, A.V.; MUSAYEV, I.A.; ISKHAKOVA, M.Kh.; KISLINSKIY, A.N.; GAL'PERIN,  
G.D.

Chemical composition of thermally cracked gasoline. Report no.3:  
Study of individual aromatic and saturated cyclic hydrocarbons.  
Dokl. AN Azerb. SSR. 14 no.4:291-298 '58. (MIRA 11:5)  
(Cracking process)

AUTHORS: Topchiyev, A. V., Member, Academy of Sciences, USSR, Musayev, I. A., Iskhakova, Z. Kh., Kisilinskiy, A. N., Gal'pern, G. D. E SOV/20-120-5-35/67

TITLE: Unsaturated Hydrocarbons in Thermal Cracking Gasoline (Nepredel'nyye uglevodorody benzina termicheskogo krekinga)

PERIODICAL: Doklady Akademii nauk SSSR, 1958, Vol. 120, Nr 5, pp. 1056 - 1058 (USSR)

ABSTRACT: After a short survey of their own previous papers in the said field (Refs 1-3) the authors communicate their investigation results of the composition of the olefine part of the fraction 60 - 150°. From these fractions 10 narrow fractions were distilled off (Table 1). The molecular weights proved that these 10 fractions may be classified in 4 groups. The fifth fraction on the whole apparently consists of cycloolefines. The authors investigated the intricate group composition of the fractions by means of a combination of the following methods: the sulfuric acid method, the hydro- and dehydrogenation catalysis and the aniline method. The content of cyclopentene hydrocarbons considerably exceeds the content of cyclohexene olefines in all fractions, as

Card 1/3

Unsaturated Hydrocarbons in Thermal Cracking Gasoline

SOV/20-120-5-35/67

is shown in table 2. The distribution of cyclenes in the fractions was irregular, as, for example the content of cyclenes in the fractions Nr 8 and 10 exceeded the content of alkenes. The proportion of the first amounted in the mentioned fractions to 69 and 55%, respectively. The fifth fraction contained the greatest amount of cyclenes - 90%. The individual composition of the hydrocarbons was investigated by means of the spectra of the light combination scattering. The methods and the apparatus were the same as in (Ref 1). The final results of the determination of the composition of the hydrocarbon of the unsaturated gasoline part which was isolated from the fraction 60 - 150° of the thermal gasoline cracking are given in table 3. As is shown the aliphatic olefines are on the whole represented by not ramified and only little ramified olefines, whereas the cyclenes belong to the 1- and 2-substituted compounds. The not detected diolefines and olefines with quaternary carbon atoms either do not exist in the investigated gasoline or their quantities are outside the range of the spectral analysis. Saturated hydrocarbons were found in none of the fractions. There are 3 tables and 11 references, 7 of which are Soviet.

Card 2/3

Unsaturated Hydrocarbons in Thermal Cracking Gasoline SOV/20-120-5-35/67

SUBMITTED: February 26, 1958

1. Hydrocarbons--Fractionation
2. Gasoline--Analysis
3. Ethylenes--Analysis
4. Ethylenes--Spectra

Card 3/3

ISKHAKOVA, E. Kh., TOPCHIEV, A. V., MUSAYEV, I. A., KISLINSKIY, A. N.,  
GALPERIN, G. D.

"Studying the Chemical Composition of Benzines Containing Unsaturated  
Hydrocarbons."

Report submitted at the Fifth World Petroleum Congress, 30 May -  
5 June 1959. New York.



SOV/65-59-7-12/12

**AUTHORS:** Topchiyev, A.V., Musayev, I.A., Iskhakova, E.Kh.,  
Sardanashvili, N.M., Kislinskiy, A.N. and Gal'pern, G.D.

**TITLE:** Individual Hydrocarbon Composition of Thermal-Cracking  
Petrol (Individual'nyy uglevodorodnyy sostav benzina  
termicheskogo krekinga)

**PERIODICAL:** Khimiya i tekhnologiya topliv i masel, 1959, Nr 7,  
pp 60-64 (USSR)

**ABSTRACT:** The authors describe the continuation of their previous  
work on the individual hydrocarbon compositions of  
petrol made by thermal cracking (Refs 1, 2 and 3).  
They now give data on the composition and properties of  
the aromatic and naphthene-paraffin 60 - 150 °C fraction  
of the petrol. Fractional distillation and a  
chromatographic method previously developed (Ref 2)  
were used. Thirty individual paraffin hydrocarbons were  
detected (twelve quantitatively), 42 naphthenes  
(22 quantitatively). The concentration of individual  
hydrocarbons was irregular. It was shown that analytic  
dehydrogenation of the naphthene-paraffin fraction of  
petrol is accompanied by formation of about 1.5%  
unsaturated hydrocarbons, consisting of olefines and

Card 1/2

SOV/65-59-7-12/12

Individual Hydrocarbon Composition of Thermal-Cracking Petrol

cyclo-olefines. M.S. Lentovskaya and N.N. Chekalova  
participated in the experimental work.  
There are 5 tables and 4 Soviet references.

Card 2/2

USCOMM\_DC-61,354

5(3), 15(3), 15(5)  
AUTHORS:

S/020/60/130/06/024/059  
B011/B015  
Topchiyev, A. V., Academician,  
Musayev, I. A., Iskhakova, E. Kh., Sardanashvili, N. M.,  
Kislinskiy, A. N., Gal'pern, G. D.

TITLE:

Investigation of the Individual Hydrocarbon Composition of  
Benzines Obtained From the Cracking of High-quality Surakhany  
Petroleum

PERIODICAL:

Doklady Akademii nauk SSSR, 1960, Vol 130, Nr 6, pp 1267 - 1269  
(USSR)

ABSTRACT:

The authors of the present paper subjected the benzines they had investigated previously (Ref 1) to further investigation: B-12 (obtained by catalytic cracking of the petroleum - gas oil fraction), B-2 (obtained by thermal cracking of fuel oil), and B-11 (obtained by the thermal cracking of the petroleum - gas oil fraction). In the fraction up to 60°, the individual hydrocarbons (Table 2) were investigated in these benzines, in the fractions 60-175° the aromatic hydrocarbons (Table 1). Table 3 contains data of the fractions up to 60°. The latter contain in each of the 3 benzines up to 30 individual hydrocarbons; e.g. in B-12 (in %): 2-methyl-butane 36.4; 2-methyl-butene-2 15.1;

Card 1/3

Investigation of the Individual Hydrocarbon Composition of Benzines Obtained From the Cracking of High-quality Surakhany Petroleum S/020/60/130/06/024/059  
B011/B015

2-methyl-pentane 8.6; n-butene (1- and 2-together 6.5). Benzine B-2 contains (in %): n-pentane 25.0; 2-methyl-butane 11.1; 2-methyl-butene-2 7.9; 2-methyl-pentane and 4-methyl-pentene-1 7.5 each; pentene-1 7.2. Benzine B-11 contains (in %): n-pentane 19.9; 4-methyl-pentene-1 12.0; 2-methyl-butene-2 10.0; pentene-1 7.7; 2-methyl-butane 7.4; cyclopentane 7.2. The influence of the processing method upon benzines from the same raw material is expressed by the different content of individual hydrocarbons. The fractions up to 60° may well be regarded as a possible raw material for the petroleum-chemical synthesis. Table 1 shows that the total yield in aromatic hydrocarbons from B-12 is twice higher than that from B-11, and five times higher than that from B-2. The most important hydrocarbons are: in B-12: ps-cumene (27% of all aromatic hydrocarbons, 8.2% of the benzine fraction up to 175°); toluene (18 and 5.4%), m-xylene (14 and 2%), ethylbenzene (10 and 3%); in B-11: toluene (30 and 4.6%), benzene (18 and 2.8%), m-xylene (9 and 1.4%), ethylbenzene 9%; in B-2: m-xylene (17 and 1.0%), toluene (14 and 0.94%), ps-cumene (13

Card 2/3

S/062/61/000/001/008/016  
B101/B220

AUTHORS: Topchiyev, A. V., Musayev, I. A., Iskhakova, E. Kh.,  
and Sardanashvili, N. M.

TITLE: Chemical composition of benzines produced by cracking of  
naphthene raw substance. Communication 1. Comprehensive  
method of investigating the detailed chemical group com-  
position of cracking benzines.

PERIODICAL: Izvestiya Akademii nauk SSSR. Otdeleniye khimicheskikh nauk,  
no. 1, 1961, 94-102

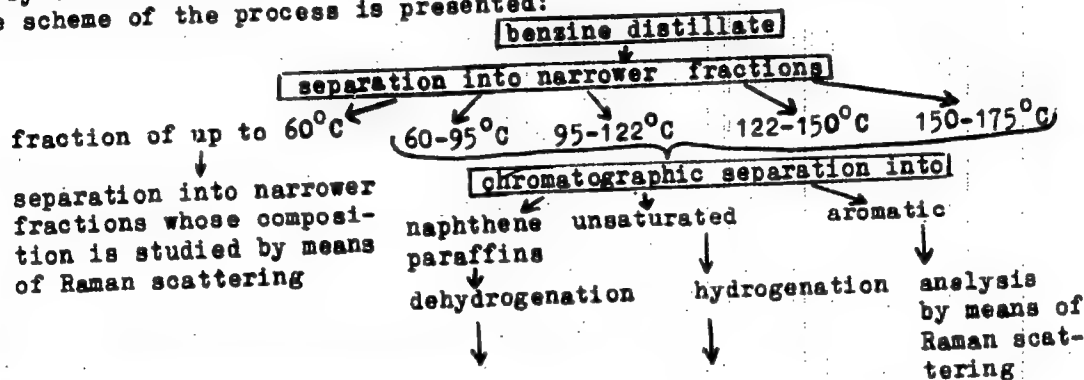
The aim of the authors was to find new raw material sources for the  
petrochemical synthesis. The present publication is a study of the effect  
of the chemical composition of the cracking material upon composition  
and structure of the products obtained by thermal or catalytic cracking.  
A previous article dealt with the chromatographic separation of cracking  
benzines into naphthene paraffins, unsaturated and aromatic hydrocarbons.  
In the present work this method has been combined with catalytic hydro-  
genation and with the aniline method. Specimens obtained by thermal and

Card 1/6

Chemical composition of benzines....

S/062/61/000/001/008/016  
B1C/B220

catalytic cracking of Surakhan petroleum served as initial products:  
1) Benzine B-12 (B-12) obtained by catalytic cracking of the kerosene-gasoil fraction (235-360°C) on an aluminum silicate catalyst at 460°C;  
2) benzine B-2 (B-2) obtained by thermal cracking of mazut (boiling point above 360°C) at 515°C and 38-40 atm; 3) benzine B-11 (B-11) obtained by thermal cracking of the kerosene-gasoil fraction at 515°C, 40 atm.  
The scheme of the process is presented:



Card 2/6

Chemical composition of benzines...

S/062/61/000/001/008/016  
B101/B220

The hydrogenation of the unsaturated hydrocarbons was performed in small autoclaves at 75-80 atm, 150-200°C with nickel upon kieselguhr as catalyst. Dehydrogenation was effected by means of platinized carbon with admixture of iron at 300-302°C. The content of aromatic hydrocarbons obtained by dehydrogenation of cyclohexane hydrocarbons, and the content of penta-methylene hydrocarbons in the dearomatized catalysate were determined by the aniline method, the content of paraffin being determined from the difference. Results are given in Table 8. They confirm that the composition of the initial substance

Card 3/6

sulfuration of  
the dehydrogeni-  
zate

determination  
of group composi-  
tion

hydrogenizate

dehydrogenation  
of the hydro-  
genizate

sulfuration of  
the dehydrogeni-  
zate

determination  
of group com-  
position

Chemical composition of benzines...

S/062/61/000/001/008/016  
B101/B220

and the method of its treatment affected the composition of the benzine obtained. T. N. Buturlova cooperated. G. D. Gal'pern and P. S. Maslov are mentioned. There are 8 tables and 11 references: 9 Soviet-bloc and 2 non-Soviet-bloc. ✓

ASSOCIATION: Institut neftekhimicheskogo sinteza Akademii nauk SSSR  
(Institute of Petrochemical Synthesis, Academy of Sciences USSR)

SUBMITTED: August 5, 1959

Card 4/6



Chemical composition of benzines...

S/062/61/000/001/008/016  
B101/B220

Детализированный групповой углеводородный состав бензинов в вес. % на исходную фракцию

2. Углеводороды	1 Бензин-12				1 Бензин-2					
	10 Температура исходной фракции, °C									
	60—95	95—122	122—150	150—175	60—95	95—122	122—150	150—175		60—95
Циклогексанные 3	2,8	13,6	9,8	10,4	3,3	8,3	7,3	5,4	3,7	
Циклопентановые 4	17,8	13,4	7,3	10,5	7,5	10,4	10,1	0,7	8,5	
Парафиновые 5	38,6	15,3	12,0	15,4	38,4	31,1	33,3	38,5	26,7	
Ароматические 6	5,1	34,0	61,4	59,7	1,1	5,1	10,2	12,8	12,5	
Циклогексеновые 7	1,0	3,8	1,7	—	2,0	6,3	7,2	6,3	3,8	
Циклопентеновые 8	10,5	11,4	3,5	4,0	9,7	13,3	0,1	4,9	10,7	
Алкены 9	28,2	8,5	4,3	—	37,9	25,5	22,8	25,3	38,3	

Card 5/6

Chemical composition of benzines...

S/062/61/000/001/008/016  
B101/B220

Таблица 8

/ Бензин-11		
95-122	122-150	150-175
10,0	7,8	9,8
8,6	9,4	10,4
20,2	20,2	22,3
19,6	18,9	19,5
9,7	8,3	7,9
9,5	9,2	8,6
22,4	24,1	24,2

Legend to Table 8: 1) benzine; 2) hydrocarbons; 3) cyclohexanes;  
4) cyclopentanes; 5) paraffins; 6) aromatic; 7) cyclohexenes;  
8) cyclopentenes; 9) alkenes; 10) temperature of initial fraction.

Card 6/6

2

5/204/62/002/004/006/019  
E075/E436

**AUTHORS:** Lavrovskiy, K.P., Brodskiy, A.M., Musayev, I.A.,  
Sanin, P.I., Rumyantsev, A.N., Filatova, Ye.D.,  
Iskhakova, E.Kh.

**TITLE:** On the preparation of higher normal  $\alpha$ -olefines by a  
high speed cracking of paraffinic petroleum products

**PERIODICAL:** Neftekhimiya, v.2, no.4, 1962, 487-494

**TEXT:** Results are described of high speed cracking of soft and hard paraffin waxes, slack wax from Bitkov crude and waxy residue from Ozek - suat crude in a pilot plant. The plant was described previously (Khim. nauka i prom-stv, v.2, no.2, 1957). The waxes were heated to 900 - 1000°C and mixed with powdered coke preheated to 600 - 750°C. They were fed into the reactor at the rate of 60 to 80 h<sup>-1</sup>. The gases produced (23.0 to 47.4% by weight of total products) contained 33.1 to 32.7% wt. ethylene. The fraction of the liquid products from the slack wax boiling between 40 - 75°C and 75 - 100°C contained heptene-1 as the main component. For the hard wax cracking products, the fraction boiling up to 60°C contained 49.80%  $\alpha$ -olefines (main component), about 20% conjugated dienes and 15 to 18% cycloenes. The content of  $\alpha$ -olefines in Card 1/2

S/204/62/002/004/006/019  
E075/E436

On the preparation of higher ...

the 60-175°C fraction was 70.4% (13.6% hexene-1, 17.1% heptene-1, 15% octene-1, 11.9% nonene-1, 12.8% decene-1). In general it was shown that the benzene from the high speed cracking of paraffin waxes consisted mainly of  $\alpha$ -paraffins, their content in benzenes from the cracking of slack wax and waxy residue being much lower. There are 11 tables.

ASSOCIATION: Institut neftekhimicheskogo sinteza AN SSSR  
(Institute of Petrochemical Synthesis AS USSR)

Card 2/2

L 36473-65 EPF(c)/EWT(m)/T Pr-4 RM/WE

ACCESSION NR: AP5010003

UR/0204/64/004/004/0567/0571 23

AUTHOR: Musayev, I. A.; Iskhakova, E. Kh.; Ramyantsev, A. N.; Kislinskiy, A. N.; Sanin, P. I.

TITLE: Investigation of olefins contained in gasolines of high-velocity cracking of paraffin petroleum products

SOURCE: Neftekhimiya, v. 4, no. 4, 1964, 567-571

TOPIC TAGS: hydrocarbon, gasoline, paraffin wax, petroleum, petroleum refining, petroleum refinery product

Abstract: The individual and group hydrocarbon compositions of fractions boiling up to 60° and the gasolines (60-175°) of high-velocity cracking of soft paraffin of sulfur petroleum and OzeK-Suatskiy mazut was studied. The gasoline (60-175°) obtained from soft paraffin contained 74% olefins of normal structure, while the gasoline from OzeK-Suatskiy mazut contained 34% of such olefins. The light fractions (up to 60°) had a high content of alpha-olefins. Concentrates of alpha-olefins were isolated by chromatography on silica gel; distillation of the concentrates on a column with an efficiency of 45 theoretical plates gave a distinct fractionation of the C<sub>6</sub>-C<sub>10</sub> alpha-olefins. High-velocity cracking of paraffin products thus was found

Card 1/2

L 36473-65

ACCESSION NR: AP5010003

to be a promising method of producing alpha-olefins. Orig. art. has 3 graphs and 4 tables.

ASSOCIATION: Institut neftekhimicheskogo sinteza im. A. V. Topchiyeva AN SSSR  
(Institute of Petrochemical Synthesis, AN SSSR)

SUBMITTED; 19Nov63

ENCL: 00

SUB CODE: FP, GC

NO REF SOV: 002

OTHER: 000

JPRS

Card 2/2

MUSAYEV, I.A.; ISKHAKOVA, E.Kh.; RUMYANTSEV, A.N.; KISLINSKIY, A.N.; SANIN, P.I.;  
Prinimali uchastiye: Buturlova, T.N., starshiy laborant; LENTOVSKAYA,  
M.S., starshiy laborant; ARTAMONOVA, R.A., starshiy laborant

Investigating olefins in gasolines from the high-speed cracking  
of paraffin petroleum products. Neftekhimla 4 no.4:567-571. JI-Ag '64  
(MIRA 17:10)

1. Institut neftekhimicheskogo sinteza im. A.V. Topchiyeva AN SSSR.

KARAVAYEV, N.M., otv. red.; ISKHAKOVA, E.Kh., red., red.

[Chemical processing of fuels; chemistry and technology]  
Khimicheskaya pererabotka topliv; khimiya i tekhnologiya.  
Moskva, Nauka, 1965. 277 p. (MIRA 18:5)

1. Moscow. Institut goryuchikh iskopayemykh. 2. Chlen-  
korrespondent AN SSSR (for Karavayev).



KOVALENKO, Antonina Fedorovna; GORCHITSYNA, Lidiya Leonidovna;  
ISKHAKOVA, Galina Alekseyevna; TSSHOKHER, V.O., prof., red.;  
MIROYEDOVA, A.N., red. izd-va;

[Effective ceramics made of easily fusible clays] Effektivnaia  
keramika iz legkoplavkikh glin. Ashkhabad, Izd-vo Akad. nauk  
Turkmenaskoi SSR, 1962. 47 p. (MIRA 16:1)  
(Ceramics) (Building materials)

ISKHAKOVA, L.A.

Comparing the results of the complex of Maksimov reactions with the  
Wassermann and Zaks-Vitebskii reactions. Lab. delo 3 no.1:32-35  
Ja-F '57 (MIRA 10:4)

1. Iz Ufinskogo koshno-venerologicheskogo instituta (dir. P.N.  
Shishkin)  
(SYPHILIS-DIAGNOSIS)

EXCERPTA MEDICA Sec 13 Vol 13/11 Dermatology Nov 59

3175. THE EMPLOYMENT OF THE PRECIPITATION REACTION OF G.S. MAXIMOV FOR CEREBROSPINAL FLUID INVESTIGATION (Russian text) - Iskhakova L. A. and Vekhnovsky G. L. - VESTN.DERM.I VEN-ER. 1958, 32/5 (37-39) Tables 1

The results of the Maximov precipitation reaction were compared in 1053 samples with the Sachs-Witebsky and Kahn tests. The Wassermann reaction and the Maximov reactions were positive in 12 patients with neuro-syphilis. The Sachs-Witebsky and Kahn tests were positive in only 4 of these cases. The Maximov test is highly sensitive and very specific, the test is very easy to carry out and isolation of the globulin fractions is not necessary.

Bielicky - Prague

*Ufimskogo kožno-venereal. Inst.*

AKHUNBAYEVA, B.O.; ISKHAKOVA, N.A.

Fructosans of wheat grain. Biokhimiia 26 no. 1:57-60 Ja-F '61.  
(MIRA 14:2)

1. Institute of Botany, Academy of Sciences of the Kirgiz S.S.R.,  
Frunze.

(FRUCTOSANS) (WHEAT)

Iskhakova, R.A.

✓ Recovery of potassium and magnesium sulphates from potassium-containing rock formations, by thermochemical process. V. V. Pechkovskii and R. A. Iskhakova (*Zh. prikl. Khim.*, 1953, 28, 1158-1160).—A method is described for the processing of special rock formations from the W. Ukraine and the subsequent recovery of  $K_2SO_4$ ,  $2MgSO_4$  and  $KCl \cdot MgSO_4 \cdot 3H_2O$  as basic materials for the production of fertilizers. The double sulphate is primarily converted to potassium sulphate and  $MgO$  by reduction with C at high temp.,  $SO_2$  and S also being formed. The reaction is accelerated by (a) an increase of temp. and (b) an increase of carbon content in the initial material.  $MgSO_4$  decomposes satisfactorily at  $950^\circ$  if C content is 15%, giving 32.7% S and 66.2% of  $SO_2$ , but at temp.  $>950^\circ$  and 25% C S is obtained almost entirely. The reaction is fastest during the first 10-20 min. The effects of varying temp. and time of reaction are tabulated.

A.L.B.

2

KUFYGIN, G.V.; ISKHAKOVA, S.B.; SEMENOV, V.A.

Immunotherapy in experimental intestinal obstruction. Eksper. khir.  
1 anest. 9 no.2:51 Mr-Ap '64. (MIRA 17:11)

1. Kafedra patofiziologii (zav. - prof. T.I. Beslekeyev) Yaroslavl'skogo  
meditsinskogo instituta.

SAVICHEV, Ye.I.; ISKHAKOVA, Ye.I.; FLYAZHNIKOVA, L.F.

Colorimetric determination of chromium based on the reaction  
with methyl violet. Zav.lab. 28 no.4:412 '62. (MIRA 15:5)

1. Leninogorskiy polimetallicheskiy kombinat.  
(Chromium Analysis)  
(Colorimetry)

ISKHANOV, R. S., Candidate Phys-Math Sci (diss) -- "Differential marginal problems of the theory of functions of a complex variable". Tbilisi, 1959, published by the Acad Sci Georgian SSR. 10 pp (Acad Sci Georgian SSR. Tbilisi Math Inst im A. M. Razmadze and Computer Center), 150 copies (KL, No 23, 1959, 160)



ISHKHANOV, V.I.

Large fibrolipoma of the stomach. Vop. onk. 6 no. 11:86-88 N '60.  
(MIRA 14:1)

(STOMACH—TUMORS)

ISKIERKA, Stanislaw, mgr inz.

Stainless chromium and chromium nickel steel rolling. Wlad hut 19  
no.4:95-97 Ap '63.

SIMEONOV, Svetozar, arkh.; ISKIERKA, Tadeush, (Iskjerka, Tadeusz), arkh.

The one-family houses in Poland. Arkhitektura 8 no.9/10:43-45 '61

ISKIERKO, Barbara; ISKIERKO, Jerzy; KOLODZIEJCZYK, Maria; NICEWICZ, Nina

Blood as a source for culture medium for production of *Corynebacterium diphtheriae* toxin. Med. dosw. mikrob. 7 no.1:65-70 1955.

1. Z Lubelskiej Wytworni Surowic i Szczepionek.

(CULTURE MEDIA,

blood for *Corynebacterium diphtheriae* toxin prod.)

(*CORYNEBACTERIUM DIPHTHERIAE*,

toxin, prod. on blood culture medium)

(BLOOD,

culture medium for *Corynebacterium diphtheriae* toxin prod.)

ISKIERKO, J.

✓ 469. Bean hydrolysate medium for cultivation of *Haemophilus pertussis*. J. Iskierko, M. Sabbo, and R. Franaszczyk. *Acta microbiol. polon.*, 1955, 4, 81-86. In the medium for the cultivation of *H. pertussis* the casein-hydrolysate could be replaced by bean-hydrolysate. The total N and amino-N in Cohen-Wheeler medium and in the medium with bean-hydrolysate were measured. The growth of *H. pertussis* on the new medium was as good as on the Cohen-Wheeler medium. No changes in morphological and antigenic characteristics of the bacteria were noted. The vaccine prepared on the new medium was tested.

B. Vinsky

MD

②

ISKIERKO-JERZO

Turbidimetric method for determination of aluminum hydroxide in purified diphtheria antitoxin. Jerzy Iskierko (Lubelska Wytwórnia Sero- i Vakcyn, Lublin, Poland). *Doklady Akad. Nauk i Umiejętności* 7: 47-53 (1956). The content of  $Al(OH)_3$  in diphtheria antitoxin and other toxins purified by adsorption on alumina is determined photometrically by determination of relative turbidity. Directly proportional values between content and turbidity hold for 0.5 to 1.0 mg./ml. The results agree with values obtained from the bromometric method. I. Z. Roberts

ISKIERKO, Barbara; ISKIERKO, Jerzy; KOLODZIEJCZYK, Maria; NICEWICZ, Hina.

Blood as a source for culture medium for production of *Corynebacterium diphtheriae* toxin. Med. dow. mikrob. 7 no.1:65-70 1955.

1. Z Lubelskiej Wytworni Surowic i Szczepionek.

(CULTURE MEDIA,

blood for *Corynebacterium diphtheriae* toxin prod.)

(*CORYNEBACTERIUM DIPHTHERIAE*,

toxin, prod. on blood culture medium)

(BLOOD,

culture medium for *Corynebacterium diphtheriae* toxin prod.)

ISKIERKO, Jerzy

Studies on amino acid composition of Linggood's medium and on toxic and detoxicated filtrates of *Corynebacterium diphtheriae* cultures by paper partition chromatography. Med. dosw. mikrob. 8 no.4:455-462 1956.

1. Z Lubelskiej Wytworni Surowic i Szczepionek Kierownik:  
Wl. Nicewicz i z Zakladu Chemii Ogolnej Wydz. Lek. A.M. w  
Lublinie, Kierownik: prof. dr. I. Krszczowska.

(*CORYNEBACTERIUM DIPHTHERIAE*, culture,

in Linggood's medium; chromatography of amino acids in  
medium & toxic & detoxicated filtrates (Pol))

(AMINO ACIDS, determination,

in *Corynebacterium diphtheriae* toxic & detoxicated filtrates  
& Linggood's medium (Pol))



ISKIERKO, Jerzy

New methods of quantitative determination of protein in blood serum with infrared radiators. Polski tygod. lek. 10 no.21:676-680 23 My '55.

1. Z Lubelskiej Wytworni Surowie i Szczepionek; kier.: dr W. Mirkowski i z Zakladu Chemii Ogolnej Akademii Medycznej w Lublinie; kier.: dr. J.Krseczkowska) Lublin, u. Glowackiego 15 m. 1.  
(BLOOD PROTEINS, determination  
quantitative, use of infrared radiators, new method)

ISKIERKO, Jerzy

Determination of amino acids in immunologically active proteins isolated from concentrated and purified diphtheria anatoxin by partition paper chromatography. Med. dosw. mikrob. 9 no.1:69-73 1957.

1. Z. Lubelskiej Wytworni Surowic i Szczepionek dr. W. Nicewics.  
Z Zakladu Chemii Ogolnej A.M. w Lublinie dr. I. Krzesczowska.

(DIPHTHERIA

anatoxin, determ. of amino acid composition of  
constituent proteins by chromatography (Pol))

(AMINO ACIDS, determ.

in proteins of diphtheria anatoxin, chromatography (Pol))

Y SKERKO  
POLAND / Microbiology. General Microbiology.

F-1

Abs J ur : Ref Zhur - Biol., No 8, 1958, No 33688

Author : Yskerko

Inst : Not given

Title : Free Aminoacids Liberated by the Brazilian Strain of  
BCG Moreau.

Orig Pub : Med. doswiad. i. mikrobiol., 1957, 9, No 2, 179-184

Abstract : Bacteria of the Brazilian strain BCG grown on Sotton's  
medium with asparagine and traces of ammonium ions  
liberate free aminoacids and adsorb them on their sur-  
face. Thirteen aminoacids synthesized by these bacteria  
were identified.

Card 1/1

KRZECZKOWSKA, I.; ISKIERKO, J.

Amino acid composition of Moreau's Brazilian BCG strain. Med.  
dow. mikrob. 9 no.2:185-188 1957.

1. Z Zakładu Chemii Ogólnej Wydziału Lekarskiego A.M. w Lublinie  
Kierownik: prof. dr. I. Krzeczowska.

(MYCOBACTERIUM TUBERCULOSIS BOVIS, metab.

amino acid composition of Moreau's Brazilian BCG strain  
(Pol))

(AMINO ACIDS, metab.

Mycobact. tuberc. bovis, composition of Moreau's  
Brazilian BCG strain (Pol))

KRZEGZKOWSKA, Irena; ISKIERKO, Jerzy; SZCZEPANIAK, Stanisław

Studies on amino nitrogen and potassium ions contents in filtrates of Moreau's Brazilian BCG strains cultured on Sauton's synthetic medium. Med. dosw. mikrob. 9 no.4:359-367 1957.

1. Z Zakładu Chemii Ogólnej Wydziału Lekarskiego A. M. w Lublinie.  
Kierownik: I. Krzeczowska.

(MYCOBACTERIUM TUBERCULOSIS BOVIC, culture,  
BCG Moreau's strain, amino nitrogen & potassium in  
filtrates of cultures in Sauton's medium (Pol))  
(NITROGEN, determination,  
in BCG, Moreau's strain, cultivated in Sauton's  
medium (Pol))  
(POTASSIUM, determination,  
same)

ISKIERKO, Jerzy

Utilisation of inorganic nitrogen by Moreau's Brazilian BCG strains in synthesis of free amino acids. Med. dosw. mikrob. 9 no.4:369-374 1957.

1. Z Zakładu Chemii Ogólnej Wydziału Lekarskiego A. M. w Lublinie.  
Kierownik: prof. I. Krzeszkowska.

(MYCOBACTERIUM TUBERCULOSIS BOVIS, metabolism,

BCG Moreau's Brazilian strain, utilisation of inorganic nitrogen in synthesis of amino acids (Pol))

(NITROGEN, metabolism,

BCG Moreau's Brazilian strain, in synthesis of amino acids (Pol))

(AMINO ACIDS, metabolism,

BCG Moreau's Brazilian strain, incorporation of inorganic nitrogen in synthesis (Pol))

ISKIERKO, Jerzy

Culture media with ammonium salts for growth of BCG cultures. Med. dosw. mikrob. 10 no.2:263-268 1958.

1. Z Zakładu Chemii Ogólnej Wydziału Lekarskiego A. M. w Lublinie  
Kierownik Zakładu: prof. dr I. Krzaczkowska.

(MYCOBACTERIUM TUBERCULOSIS BOVIS, culture,

BCG, on media containing ammonium salts (Pol))

(AMONIUM, COMPOUNDS

in BCG culture media (Pol))

ISKIERKO, Jerzy

Direct paper chromatography of acid protein hydrolysates. Med. dosw. mikrob. 11 no.1:63-69 1959.

1. Z Zakładu Chemii Ogólnej Szpitalu Lekarskiego A. M. w Lublinie  
Kierownik Zakładu: dr I. Krzeszkowska.

(AMINO ACID MIXTURES,  
repeat title (Pol))



ISKIERKO, Jerzy

Studies on free and protein-bound amino acids in cells of *Corynebacterium diphtheriae* strain P.W.8. Med.dow.mikrob. 12 no.1: 43-52 '60.

1. Z Zakładu Chemii Ogólnej Wydziału Lekarskiego A.M. w Lublinie.  
Kierownik: doc.dr I. Krseczkowska.  
(AMINO ACIDS chem.)  
(*CORYNEBACTERIUM DIPHTHERIAE* chem.)

ISKIERKO, Jerzy

Methodological studies on direct chromatography of acid hydrolysates.  
Med.dosw.mikrob. 13 no.2:197-203 '61.

1. Z Katedry Chemii Ogólnej Wydziału Lekarskiego A.M. w Lublinie  
Kierownik: doc. dr I. Krzeczowska.

(PROTEIN HYDROLYSATES chem)

ISKIERKO, Jerzy; KRZECZKOWSKA, Irena

Studies on the application of copper phosphate suspension for quantitative determination of d-glucosamine. Ann. Univ., Lublin sect.D 16:291-298 '61.

1. Z Katedry i Zakładu Chemii Ogólnej Wydziału Lekarskiego Akademii Medycznej w Lublinie Kierownik: doc. dr Irena Krzeczkowska.  
(COPPER) (PHOSPHATES) (GLUCOSAMINE)

ISKIERKO, Jerzy

Free and bound amino acids in some organs in tissues of *Potamobius astacus* and *Potamobius leptodactylus*. *Acta physiol. polon.* 13 no.3: 455-461 '62.

1. Z Katedry Chemii Ogólnej Wydziału Lekarskiego AM w Lublinie Kierownik:  
doc. dr. I. Krzeczowska.  
(AMINO ACIDS metab) (CRUSTACEA metab)

ISKIERKO, J.

POLAND

Jerzy ISKIERKO, Department of General Chemistry, Medical Faculty  
(Zaklad Chemii Ogolnej Wydzialu Lekarskiego,) Lublin.

"The Protein Fractions of Purified Concentrated Diphtheria Toxoid."

Warsaw, Medycyna Doswiadczalna i Mikrobiologia, Vol 14, No 4, 1962;  
pp 323-329.

Abstract [English summary modified]: Study of diphtheria toxin with  
description of amino-acid composition of four fractions: fraction 1  
adsorbable on active  $Al(OH)_3$ , possessing characteristic protein  
precipitable at iso-electric point pH 4.1 to 4.3, containing amino-acids  
specific for highly purified toxin or toxoid. Fraction 3 glycopeptide,  
cellophane-dialyzable, probably cell-wall decomposition product.  
Suggest toxoid contains unspecific proteins, i.e. vaccine insufficiently  
purified. Two tables, 9 Polish, 1 Soviet and 11 Western references.

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POLAND

ISKIERKO, Jerzy, Chair and Department of General Chemistry (Katedra i Zaklad Chemii Ogolnej), Medical Faculty (Wydzial Lekarski), AM [Akademia Medyczna, Medical Academy], Lublin

"Studies on the Surface and Chemical Structures of Diphtheria Toxin and Toxoid. I. Binding of  $\text{Cu}^{++}$  Ions by Pulverized, Purified, and Lyophilized Diphtheria Toxin and Toxoid."

warsaw, Medycyna Doswiadczalna i Mikrobiologia, Vol 15, No 3, 63, pp 199-206

Abstract: [Author's English summary] Diphtheria toxin and toxoid showed the same capacity for binding  $\text{Cu}^{++}$  ions, as determined by polarographic, colorimetric, and iodometric methods, and the formaldehyde does apparently not block the lone nitrogen electron pairs in the amino groups of the toxin. The author calculated the number of amino groups present on the surface of a toxin particle from the amount of Cu fixed by one mole of the toxin (molar weight 72,000), as well as the percentage of nitrogen participating in binding the Cu ions. 32 references: 3 Polish and the other Western.

1/1

ISKIERKO, Jerzy

Chemical structure of diphterial toxin and toxoid. Parts 2 - 4.  
Med. dosw. mikrobiol. 17 no.3:217-232 '65.

1. Z Katedry i Zakladu Chemii Ogolnej AM w Lublinie (Kierownik:  
doc. dr. I. Krzeczowska).

ISKIN, I.P.

SUBJECT USSR / PHYSICS CARD 1 / 2 PA - 1562  
 AUTHOR ISKIN, I.P., KAGANER, M.G.  
 TITLE The Investigation of the Thermodynamic Properties of Air and Nitrogen at Low Temperatures under Pressure.  
 I. The Determination of the Isothermal Throttle Effect of Air and Nitrogen.  
 PERIODICAL Zurn.techn.fiz, 26, fasc. 10, 2329-2337 (1956)  
 Issued: 11 / 1956

The present work aims at determining experimental data concerning these thermodynamic properties and the construction of new and accurate state diagrams of these gases with the help of the isothermal throttle effect. On this occasion the lateral heat transfer of the gas to the surrounding medium is practically fully eliminated and at a low gas consumption and a smaller apparatus greater accuracy is obtained, and, besides, computation of enthalpy is made easier.

At first the experimental order is described. Together with the determination of temperature in the kryostat, the flow of the gas to be investigated is sent through the calorimeter. Pressure and gas consumption as well as pressure drop were controlled by means of regulating valves (at the in- and output of the calorimeter), and by means of a throttle valve.

Experimental results are shown in tables. The isothermal throttle effect of air and nitrogen was measured within the temperature range of from  $+30^{\circ}$  to  $-183^{\circ}$  C and at pressures of from 1,5 to 50 atm. According to experimental data the iso-



ISKIN, I.Ya., inzh. (Moskva); LYSENKO, Ye.V., inzh. (Moskva)

Automatic reservation device using a single-beam network.

Elektrichestvo no.5:14-17 My '63.

(MIRA 16:7)

(Electric power distribution)

ISKIN, S.S.

Unit for removing burr and for polishing. Av.prom. 26 no.8:86  
Ag. '57. (MIRA 15:4)

(Grinding machines)

PATALAKHA, G.B.; KURBANAYEV, M.S.; IS'KIV, B.M.

Comparison of some methods of the statistical processing of  
spectral analysis in geochemical studies. Izv. AN Kazakh. SSR  
Ser. geol. 22 no. 6:69-74 N-D '65 (MIRA 19:1)

1. Institut geologicheskikh nauk imeni K.I. Satpayeva, Alma-Ata,  
i Kazakhskiy filial Vsesoyuznogo instituta razvedochnoy geo-  
fiziki, Alma-Ata.

LATSINIK, Ye.Ya., prof.; SUSHKO, S.R.; FILONOVSKAYA, M.G.; ISKOL'D, G.Z. (Odessa)

Diagnosis and clinical aspects of salmonellosis caused by  
Heidelberg and London bacteria. Vrach.delo no.2:143-147  
P '59. (MIRA 12:6)

1. Gorodskaya infektsionnaya bol'nitsa.  
(SALMONELLA)